Bacteria: 2 kingdoms Eubacteria (most common) and Archaebacteria. As prokaryotes they have cells with ribosomes but lack membrane bound organelle. Genetic material is in a DNA molecule, but it is free in the cell. Most have a cell wall around the plasma (outer) membrane. Most are unicellular but some form colonies or filaments with specialized cells in the filament for nitrogen fixing. In some, the plasma membrane folds inward for energy transfer. Most bacteria are heterotrophs, decomposing organic matter. Some are autotrophs (photosynthetic or chemosynthetic)